

**BB1333USCIP (DPNT0003-100)****Application No.: 10/059,909****AMENDMENTS TO THE CLAIMS:**

This listing of claims will replace all prior versions, and listings, of claims in the application:

**Listing of Claims:**

**Claim 1 (previously presented):** An isolated polynucleotide comprising:

- (a) a nucleotide sequence encoding a polypeptide having lipxygenase activity, wherein the amino acid sequence of the polypeptide and the amino acid sequence of SEQ ID NO:16 have at least 80% sequence identity based on the Clustal alignment method, or
- (b) the complement of the nucleotide sequence, wherein the complement and the nucleotide sequence contain the same number of nucleotides and are 100% complementary.

**Claim 2 (previously presented):** The polynucleotide of Claim 1, wherein the amino acid sequence of the polypeptide and the amino acid sequence of SEQ ID NO:16 have at least 85% identity based on the Clustal alignment method.

**Claim 3 (previously presented):** The polynucleotide of Claim 1, wherein the amino acid sequence of the polypeptide and the amino acid sequence of SEQ ID NO:16 have at least 90% identity based on the Clustal alignment method.

**Claim 4 (previously presented):** The polynucleotide of Claim 1, wherein the amino acid sequence of the polypeptide and the amino acid sequence of SEQ ID NO:16 have at least 95% identity based on the Clustal alignment method.

**Claim 5 (previously presented):** The polynucleotide of Claim 1, wherein the amino acid sequence of the polypeptide comprises the amino acid sequence of SEQ ID NO:16.

**Claim 6 (previously presented):** The polynucleotide of Claim 1 wherein the nucleotide sequence comprises the nucleotide sequence of SEQ ID NO:15.

**Claim 7 (original):** A vector comprising the polynucleotide of Claim 1.

**Claim 8 (original):** A recombinant DNA construct comprising the polynucleotide of Claim 1 operably linked to a regulatory sequence.

**BB1333USCIP (DPNT0003-100)**

**Application No.: 10/059,909**

**Claim 9 (original):** A method for transforming a cell, comprising transforming a cell with the polynucleotide of Claim 1.

**Claim 10 (original):** A cell comprising the recombinant DNA construct of Claim 8.

**Claim 11 (original):** A method for producing a plant comprising transforming a plant cell with the polynucleotide of Claim 1 and regenerating a plant from the transformed plant cell.

**Claim 12 (original):** A plant comprising the recombinant DNA construct of Claim 8.

**Claim 13 (original):** A seed comprising the recombinant DNA construct of Claim 8.

**Claims 14-20 (cancelled)**